



UNITED STATES PATENT AND TRADEMARK OFFICE

UNITED STATES DEPARTMENT OF COMMERCE
United States Patent and Trademark Office
Address: COMMISSIONER FOR PATENTS
P.O. Box 1450
Alexandria, Virginia 22313-1450
www.uspto.gov

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
-----------------	-------------	----------------------	---------------------	------------------

10/731,548

12/05/2003

Peter Szpak

42323-244143

4558

26694

7590

07/02/2009

VENABLE LLP

P.O. BOX 34385

WASHINGTON, DC 20043-9998

EXAMINER

KE, PENG

ART UNIT

PAPER NUMBER

2174

MAIL DATE

DELIVERY MODE

07/02/2009

PAPER

Please find below and/or attached an Office communication concerning this application or proceeding.

The time period for reply, if any, is set in the attached communication.

Office Action Summary	Application No. 10/731,548	Applicant(s) SZPAK ET AL.	
	Examiner SIMON KE	Art Unit 2174	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 3/23/09.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1,3-16,18-25,27-33 and 37-41 is/are pending in the application.
- 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) _____ is/are allowed.
- 6) ☒ Claim(s) 1, 3-16, 18-25, 27-33, and 37-41 is/are rejected.
- 7) ☐ Claim(s) _____ is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on _____ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some * c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
 2. ☐ Certified copies of the priority documents have been received in Application No. _____.
 3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- | | |
|--|---|
| 1) <input checked="" type="checkbox"/> Notice of References Cited (PTO-892) | 4) <input type="checkbox"/> Interview Summary (PTO-413) |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948) | Paper No(s)/Mail Date. _____ |
| 3) <input type="checkbox"/> Information Disclosure Statement(s) (PTO/SB/08) | 5) <input type="checkbox"/> Notice of Informal Patent Application |
| Paper No(s)/Mail Date _____ | 6) <input type="checkbox"/> Other: _____ |

DETAILED ACTION

This action is responsive to communications: Amendment, filed on 3/23/09.

Claims 1, 3-16, 18-25, 27-33, and 37-41 are pending in this application. Claims 1, 16, 30, 31, 32, and 33 are independent claims.

Double Patenting

Claim 38 objected to under 37 CFR 1.75 as being a substantial duplicate of claim 39. When two claims in an application are duplicates or else are so close in content that they both cover the same thing, despite a slight difference in wording, it is proper after allowing one claim to object to the other as being a substantial duplicate of the allowed claim. See MPEP § 706.03(k).

Claim Rejections - 35 USC § 103

The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

Claims 1, 3-5, 7-9, 11-16, 18-20, 22-24, 27-33 and 37-41 are rejected under 35 U.S.C. 103(a) as being unpatentable over Mikovsky US Patent No. 7,013,297 further in view of Liu US

Art Unit: 2174

Patent 7,296,256.

Regarding independent claim 1, Miksovsky teaches a method for generating embedded code from a graphical model (see Miksovsky col.11, lines 20-40), comprising the steps of: prompting a user to specify the embedded code from a plurality of embedded code (see Miksovsky col.11, lines 37-65) and each embedded code relating to a characteristic of code to be generated from the graphical interface. (see Miksovsky, col. 11, lines 65-col. 12, lines 12) Miksovsky teach generating code for a code generation goal, the at least one code generation goal being used to generate embedded code from the graphical model in a graphical modeling environment; (see Miksovky col. 9, lines 5-col. 10, lines 70) Changing parameters of the graphical model that are inconsistent with the at least one code generation goal; (see Miksovky col. 9, lines 5-col. 10, lines 70)

However, it fails to teach the graphical model representing a dynamic system having time-changing behavior modeled with differential, difference, and/or algebraic equation, the graphical model being capable of simulation based on the equation.

Liu teaches the graphical model representing a dynamic system having time-changing behavior modeled with differential, difference, and/or algebraic equation, the graphical model being capable of simulation based on the equation. (see Liu, col. 9, lines 35- col. 10, lines 57)

It would have been obvious to an artisan at the time of the invention to include Liu's teaching with method of Miksovky in order to provide user with an automating process-

Art Unit: 2174

performance model that optimizes of IT infrastructure and application to reduce both equipment and labor cost.

Regarding dependent claim 3, Miksovky and Liu teach the method of claim 1, further comprising the step of providing feedback to the user regarding the compliance of the graphical model with a selected condition (see Miksovky, col. 13, lines 20-65).

Regarding dependent claim 4, Milksovky and Liu teach the method of claim 3, wherein the user selects the selected condition through a user interface (see Miksovky col. 9, lines 5-col. 10, lines 70).

Regarding dependent claim 5, Milksovky and Liu teach the method of claim 4, wherein the user interface displays a list of conditions to be checked, and prompts the user to select one or more of the conditions (see Miksovky col. 9, lines 5-col. 10, lines 70).

Regarding dependent claim 7, Milksovky, and Liu teach the method of claim 3, further comprising the step of modifying an object of the graphical model that does not comply with the selected condition (see Miksovky col. 10, lines 5-col. 11, lines 20).

Regarding dependent claim 8, Miksovky, and Liu teach the method of claim 7, wherein the step of modifying comprises identifying the object and prompting the user to manually

Art Unit: 2174

modify a parameter of the object (see Miksovky col. 9, lines 5-lines 70).

Regarding dependent claim 9, Milksovky and Liu teach the method of claim 7, wherein the step of modifying comprises automatically modifying a parameter of the graphical model to comply with the selected condition (see Miksovky col. 10, lines 5-col. 10, lines 70).

Regarding dependent claim 11, Milksovky and Liu teach the method of claim 1, wherein each code generation goal corresponds to a general code generation goal (see Miksovky col. 10, lines 5-col. 10, lines 70).

Regarding dependent claim 12, Miksovky and Liu teach the method of claim 11, further comprising the step of prompting the user to specify at least one detailed code generation goal for each specified general code generation goal (see Miksovky col. 10, lines 5-col. 10, lines 70).

Regarding dependent claim 13, Miksovky and Liu teach the method of claim 12, further comprising the step of configuring the graphical model to comply with each detailed code generation goal. (see Miksovky col. 10, lines 5-col. 10, lines 70)

As per claim 14, it is rejected under the same rationale as claim 1. Supra.

Art Unit: 2174

Regarding dependent claim 15, Miksovky and Liu teach the method of, claim 14, further comprising the step of identifying a condition that does not comply with the code generation goals specified by the user (see Miksovky, col. 16, lines 35-47).

As per claim 16, it is rejected under the same rationale as claim 1. Supra.

As per claim 18, which is dependent on claim 16, it is rejected under the same rationale as claim 5. Supra.

Regarding dependent claim 19, which is dependent on claim 18, it is rejected under the same rationale as claim 4. Supra..

Regarding dependent claim 20, which is dependent on claim 19, it is rejected under the same rationale as claim 5. Supra.

Regarding dependent claim 22, which is dependent on claim 18, it is rejected under the same rationale as claim 7. Supra.

Regarding dependent claim 23, which is dependent on claim 22, it is rejected under the same rationale as claim 8. Supra.

Regarding dependent claim 24, which is dependent on claim 22, it is rejected under the same rationale as claim 9. Supra

Art Unit: 2174

Regarding dependent claim 27, which is dependent on claim 16, it is rejected under the same rationale as claim 11. Supra

Regarding dependent claim 28, which is dependent on claim 27, it is rejected under the same rationale as claim 12. Supra

Regarding dependent claim 29, which is dependent on claim 28, it is rejected under the same rationale as claim 13. Supra

Regarding independent claims 30-33, it is rejected under the same rationale as claim 1. Supra.

Regarding dependent claim 37, which is dependent on claim 33, it is rejected under the same rationale as claim 3. Supra.

Regarding dependent claim 38, which is dependent on claim 37, it is rejected under the same rationale as claim 7. Supra.

Regarding dependent claim 39, which is dependent on claim 37, it is rejected under the same rationale as claim 7. Supra.

Art Unit: 2174

Regarding dependent claim 40, Miksovky, and Liu teach the method claim 1, Miksovky further teaches where in at least code generation goal is a target application code generation goal, (see Miksovsky, col. 9, lines 20-col. 10, line 5) ; The application model is a code generation goal which is from the from group consisting of: a target application code generation goal; a maximum efficiency code generation goal; an aspect of memory code generation goal; an auto-generated identifier code generation goal; a comment code generation goal; an interface code generation goal; a model combination code generation goal; and a hypertext markup language report code generation goal. (see Miksovsky, col. 9, lines 20-col. 10, line 5)

Regarding dependent claim 41, Coad, Little and Liu teaches the method claim 1. Little teaches the at least one code goal is selected from the group consisting of:

A set of predefined options for an interface code generation goal comprising a passing data as arguments option and a not passing data as argument option; (see Miksovsky, col. 9, lines 20-col. 10, line 5)

A set of predefined options for a target application code generation goal comprising a floating point target application option, a mixed point target application option, and a fixed point target application option;

a set of predefined options for a maximum efficiency code generation goal comprising a maximum efficiency option and a non-maximum efficiency option;

a set of predefined options for an aspect of memory code generation goal comprising a Random Access Memory (RAM) option and a Read-Only Memory (ROM) option;

a set of predefined options for an auto-generated identifier code generation goal comprising a verbose auto-generated identifier option and a non-verbose auto-generated identifier option;

a set of predefined options for a traceability code generation goal comprising a comments in the code option and a no comments in the code option;

Art Unit: 2174

a set of predefined options for a model combination code generation goal comprising a single model option and a multiple model option; (see Miksovsky, col. 9, lines 20-col. 10, line 5) and

a set of predefined options for a reporting code generation goal comprising an option for including a HTML report with the generated code and an option for not including a HTML report with the generated code.

Claims 10 and 25 are rejected under 35 U.S.C. 103(a) as being unpatentable over Miksovsky US Patent No. 7,013,297 further in view of Liu US Patent 7,296,256 further in view of Coad US Patent No. 6,851,105

Regarding dependent claim 10, Miksovsky, and Liu teach the method of claim 1. They fail to teach wherein the graphical model is a block diagram.

Coad teaches the graphical model is a block diagram (see also FIG. 9-12 et seq. of Coad)

It would have been obvious to an artisan at the time of the invention to include Coad's teaching with method Miksovsky in order to provide user with representation of the component relationships.

Regarding dependent claim 25, which is dependent on claim 16, it is rejected under the same rationale as claim 10.

Claims 6 and 21 are rejected under 35 U.S.C. 103(a) as being unpatentable over Miksovsky US Patent No. 7,013,297 further in view of Liu US Patent 7,296,256. further in view of Frid-Nielsen ("Frid-Nielsen" US Patent No. 5,339,433)

Art Unit: 2174

Regarding dependent claim 6, Miksovsky and Liu teach the method of claim 3, wherein the step of providing feedback to the user regarding the compliance of the graphical model with a selected condition comprises: Display non-comply with the selected condition (i.e. compare “Check variations for ... errors” in FIG. 15b et seq. of Coad with)

They fail to teach displaying a hyperlink for linking the selected condition to an object of the graphical model.

Frid-Nielsen teaches displaying a hyperlink for linking the selected condition to an object of the graphical model. (see. In FIG. 5 et seq. of Frid-Nielsen).

It would have been obvious to an artisan at the time of the invention to include Frid-Nielsen’s teaching with method of Miksovsky, and Liu in order provide the user with dynamic access to object graphical model.

Regarding dependent claim 21, Miksovsky, and Liu teach the method of claim 18, wherein the step of indicating to the user whether the graphical model complies an object of the graphical model that does not comply with the selected condition (i.e. compare “Check variations for ... errors” in FIG. 15b et seq. of Coad with links in FIG. 5 et seq. of Frid-Nielsen).

They fail to teach displaying a hyperlink for linking the selected condition to an object of the graphical model.

Frid-Nielsen teaches displaying a hyperlink for linking the selected condition to an object of the graphical model. (see. In FIG. 5 et seq. of Frid-Nielsen).

Art Unit: 2174

It would have been obvious to an artisan at the time of the invention to include Frid-Nielsen's teaching with method of Miksovsky, and Liu in order provide the user with dynamic access to object graphical model.

Response to Arguments

Applicant's arguments with respect to claims 1, 3-16, 18-25, 27-33, and 37-41 have been considered but are moot in view of the new ground(s) of rejection.

Contact Information

Any inquiry concerning this communication or earlier communications from the examiner should be directed to SIMON KE whose telephone number is (571)272-4062. The examiner can normally be reached on M-Th and Alternate Fridays 8:30-5:00.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Dennis Chow can be reached on (571) 272-7767. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

Application/Control Number: 10/731,548

Page 12

Art Unit: 2174

Peng Ke

/Peng Ke/

Primary Examiner, Art Unit 2174